

**STATE WATER RESOURCES CONTROL BOARD
BOARD MEETING SESSION – DIVISION OF WATER QUALITY
APRIL 18, 2023**

ITEM 3

SUBJECT

CONSIDERATION OF A PROPOSED RESOLUTION AUTHORIZING THE DEPUTY DIRECTOR OF THE DIVISION OF FINANCIAL ASSISTANCE AND DEPUTY DIRECTOR'S DESIGNEE TO EXECUTE AND AMEND GRANT AGREEMENTS ADMINISTERING AN ALLOCATION FROM THE BUDGET ACT OF 2022 FOR DEEP WATER INTAKE LOCATION DESALINATION STUDY.

DISCUSSION

California's August 2022 "Water Supply Strategy, Adapting to a Hotter, Drier Future" (Water Supply Strategy) projects that the hotter and drier weather could diminish California's existing water supply by up to 10% by 2040 due to accelerating climate change, and establishes new goals and specific implementation actions to ensure California has the water needed for generations to come. The Water Supply Strategy sets the goal of expanding brackish groundwater desalination production by 28,000 acre-feet per year by 2030 and 84,000 acre-feet per year by 2040 and directs the State Water Board to develop siting criteria for seawater desalination facilities by June 30, 2023, to help streamline and expedite permitting for new or expanded facilities.

Some coastal communities consider seawater desalination as a component of a resilient portfolio of local water supplies in concert with water conservation, reuse of wastewater through recycling, capture and use of stormwater, brackish groundwater desalination, and traditional methods for utilizing surface water and groundwater supplies. The operation and construction of seawater desalination facilities can lead to marine life mortality and harm to aquatic life beneficial uses; consequently, permitting a new or expanded desalination facility in the State requires careful planning and interagency coordination with significant focus on its potential impacts to both natural and economic resources.

California Water Code section 13142.5, subdivision (b) (hereafter Water Code section 13142.5(b)), adopted as part of the California Coastal Act of 1976, requires "for each new or expanded coastal powerplant or other industrial installation using seawater for cooling, heating or industrial processing, the best available site, design, technology and mitigation measures feasible shall be used to minimize the intake and mortality of all forms of marine life." Water Code section 13142.5(d) states: "Independent baseline studies of the existing marine system should be conducted in the area that could be affected by a new or expanded industrial facility using seawater in advance of the carrying out of the development."

On May 6, 2015, the State Water Board adopted an amendment to the Water Quality Control Plan for the Ocean Waters of California (Ocean Plan) that provides direction to the regional water quality control boards on implementation of Water Code Section 13142.5(b) to minimize intake and mortality of all forms of marine life associated with the construction and operation of new or expanded seawater desalination facilities. The Ocean Plan requires the use of subsurface intakes if feasible because they are the best method for minimizing intake and mortality of all forms of marine life. Aquifer characteristics vary with the geology, structure, and topography of the substrate in which they occur, and detailed site specific hydrogeological and geophysical surveys and mapping are needed to determine the feasibility of installing subsurface intakes as well as an evaluation of local geologic conditions to determine the appropriate intake design, size, and flow capacity.

In January 2020, the State Water Board established the Seawater Desalination Memorandum of Agreement (MOA) that memorializes the relationship between agencies to coordinate timely and effective review of environmental documents and permits or lease applications for proposed seawater desalination facilities and demonstrates the Water Boards' ongoing commitment to interagency coordination. The signatories of the MOA include: State Water Resources Control Board, California Coastal Commission, California State Lands Commission, California Department of Fish and Wildlife, North Coast Regional Water Quality Control Board, San Francisco Bay Regional Water Quality Control Board, Santa Ana Regional Water Quality Control Board, San Diego Regional Water Quality Control Board, Monterey Bay National Marine Sanctuary, and National Marine Fisheries Service's West Coast Region.

In October 2022, to support implementation of the Water Supply Strategy, Division of Water Quality staff convened a Desalination Interagency Group comprised of the signatories for the Seawater Desalination MOA and representation from the California Ocean Protection Council, California Natural Resources Agency, California Department of Water Resources, and California State Coastal Conservancy.

Assembly Bill 179, Sec. 19.56(e)(2)(K) (Stats. 2022, ch. 249) known as the Budget Act of 2022, appropriated \$1,000,000 in Sec. 19.56.(e)(2)(K) to the State Water Board for the Deep Water Intake Location Desalination Study. The \$1,000,000 appropriated in Sec. 19.56.(e)(2)(K) is available for encumbrance through June 30, 2024 and expenditure until June 30, 2026.

The proposed resolution would authorize the Deputy Director of the Division of Financial Assistance to award and amend grant agreements for seawater desalination study or studies to support implementation of the Ocean Plan and direct Division of Water Quality staff in consultation with the Desalination Interagency Group to identify the scope of study or studies consistent with the Ocean Plan requirements and California's Water Supply Strategy implementation actions.

POLICY ISSUE

Should the State Water Board:

1. Authorize the Deputy Director of the Division of Financial Assistance and Deputy Director's Designee to execute and amend grant agreements to direct up to \$1,000,000 for seawater desalination studies that support implementation of the Ocean Plan and the Water Supply Strategy consistent with the encumbrance and expenditure deadlines or as those encumbrance and expenditure deadlines may be amended by future legislation?
2. Direct Division of Water Quality staff to continue to consult with the Desalination Interagency Group to identify the subsurface desalination studies and related scopes of work that meet the legislative intent and Budget Act requirements to support implementation actions in the Water Supply Strategy?

FISCAL IMPACT

The Budget Act of 2022 does not provide administrative funding to the State Water Board for this item. Division of Financial Assistance and Division of Water Quality will redirect staff from other funding programs to administer the funds.

REGIONAL BOARD IMPACT

The North Coast Regional Water Quality Control Board, the San Francisco Regional Water Quality Control Board, the Los Angeles Regional Water Quality Control Board, the Santa Ana Regional Water Quality Control Board, and the San Diego Regional Water Quality Control Board staff will be consulted in developing the scope of work for the grant agreements and will participate in evaluating grant deliverables.

STAFF RECOMMENDATION

Staff recommends that State Water Board adopt the proposed resolution.